DEPARTMENT OF TRANSPORTATION
DIVISION OF ENGINEERING SERVICES
Office of Structural Materials
Quality Assurance and Source Inspection

Bay Area Branch
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Contract #: 04-0120F4
Cty: SF/ALA Rte: 80 PM: 13.2/13.9
File #: 99.28

WELDING INSPECTION REPORT

Resident Engineer: Pursell, Gary
Address: 333 Burma Road
City: Oakland, CA 94607

Report No: WIR-001704
Date Inspected: 12-Mar-2008

Project Name: SAS Superstructure
Prime Contractor: American Bridge/Fluor Enterprises, a JV
Contractor: Japan Steel Works, Ltd.

OSM Arrival Time: 830
OSM Departure Time: 1830
Location: Muraron, Japan

CWI Name: Mukhmud Ashadi

Inspected CWI report:	☐ Yes	☑ No	☐ N/A	**CWI Present:**	☑ Yes	☐ No	
Electrode to specification:	☑ Yes	☐ No	☐ N/A	**Rod Oven in Use:**	☑ Yes	☐ No	☐ N/A
Qualified Welders:	☑ Yes	☐ No	☐ N/A	**Weld Procedures Followed:**	☑ Yes	☐ No	☐ N/A
Approved Drawings:	☑ Yes	☐ No	☐ N/A	**Verified Joint Fit-up:**	☑ Yes	☐ No	☐ N/A
				Approved WPS:	☑ Yes	☐ No	☐ N/A
				Delayed / Cancelled:	☐ Yes	☐ No	☑ N/A

Bridge No: 34-0006
Component: PQR Test Plate, SW-4-1

Summary of Items Observed:

On this date OSM Quality Assurance Representative Daniel L. Reyes observed the casting of the cable saddles, welding of the structural steel components and inspection relative to this project. The following was observed:

At the start of the shift this QA inspector observed the continued welding and inspection of the Procedure Qualification Record (PQR) test plate identified as SW-4-1. The welding was performed by Japan Steel Works, Ltd. welding personnel Ko Payashi ID 08-5023 and test plate was placed to the Flat (1G) position. Mr. Payashi utilized the Shielded Metal Arc Welding (SMAW) as per the Welding Procedure Specification (WPS) SJ-2942 WP-5 which was also used by the Quality Control (QC) Inspector Makhmud Ashadi as a reference. The consumable utilized during the welding of the test plate was identified as a Hobart Electrode (Hoballoy) E9018-M with a diameter of 4.8 millimeters.

The QC inspector Mr. Ashadi verified the minimum preheat temperature of 160 degrees Celsius and at the conclusion of verifying the surface temperature the welder Mr. Payashi continued the welding of the fill passes. At this time this QA inspector observed the QC inspector verifying the amperage, voltage and travel speed. The average welding parameters were observed by this QA inspector as follows; 265 amps, 24.0 volts with a travel speed measured at 149 mm/m. At approximately 1430 hours the welder Mr. Payashi completed the thirty millimeters (30) of welding utilizing the SMAW process. At this time this QA inspector observed the QC inspector Mr. Ashadi randomly verify the dimension of approximately 30 mm. Mr. Ashadi utilized a 300 mm rule and straight edge to perform this measuring task.

At this time the welder Mr. Payashi commenced the preparation of the gas shielded Fluxed Cored Arc Welding (FCAW-G) process to be utilized for the remaining weld layers. This preparation task was completed at approximately

WELDING INSPECTION REPORT

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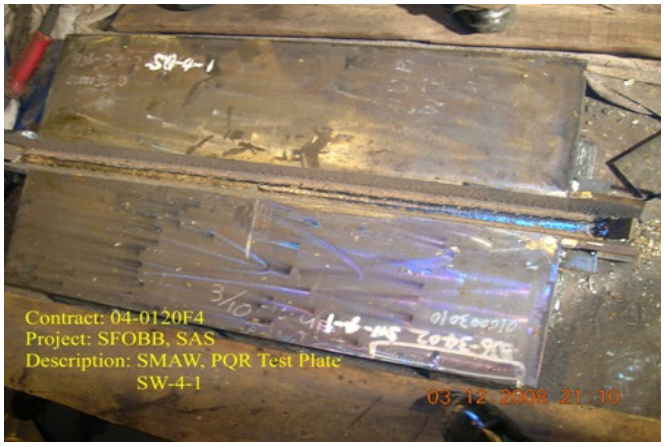
1520 hours and this QA inspector observed the performance of the welding by Mr. Payashi and the inspection and verification performed by the QC inspector Mr. Ashadi. The welding consumable utilized for the FCAW process was TM 95K2 with a diameter size of 1.6 mm and a CO2 shielding gas composition was utilized.
Later in the shift this QA inspector observed, at random intervals, the QC inspector Makhmud Ashadi performing the in process weld inspection and verifying the minimum preheat and maximum interpass temperatures. The welding of the Test Plate identified as SW-4-1 was not completed during this shift on this date and appeared to comply with the WPS. (See Digital Photographs)



Summary of Conversations:

There were general conversations with the Quality Control (QC) Inspector Makhmud Ashadi relative to the Procedure Qualification Record Test and the location of the welding personnel.

Comments

This report is for the purpose of determining conformance with the contract documents and is not for the purpose of making repair or fit for purpose recommendations. Should you require recommendations concerning repairs or remedial efforts please contact Venkatesh Iyer, (858) 967-6363, who represents the Office of Structural Materials for your project.

Inspected By:	Reyes,Danny	Quality Assurance Inspector
Reviewed By:	Brasel,Ron	QA Reviewer